

# Comparisons of Job Characteristics

**Focus Occupation:** [Airline Pilots, Copilots, and Flight Engineers \(53-2011\)](#)

**Associated Occupation:** [Air Traffic Controllers \(53-2021\)](#)

[Compare Knowledge](#)

[Compare Skills](#)

[Compare Abilities](#)

[Compare Detailed Work Activities](#)

[Compare Tools and Technologies](#)

<<	Focus occupation element is much lower
<	Focus occupation element is lower
0	Focus occupation element is at a similar level
>	Focus occupation element is at a higher level
>>	Focus occupation element is at a much higher level

## Knowledge

Similarity of Focus Occupation to Associated Occupation: 88

**Focus Occupation:** Airline Pilots, Copilots, and Flight Engineers (53-2011)

**Associated Occupation:** Air Traffic Controllers (53-2021)

Associated Occupation's Key Knowledge Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating		Evaluation of Focus Occupation
Transportation	4.6	20.1	23.1	>	Current knowledge level is likely sufficient
Public Safety and Security	6.9	11.1	15.8	>>	Current knowledge level is likely more than sufficient
Geography	3.9	11.0	15.7	>>	Current knowledge level is likely more than sufficient
Telecommunications	3.9	8.4	6.0	<<	Extensive education and/or training may be required

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O\*NET (Occupation Information Network) data.

## Skills

Similarity of Focus Occupation to Associated Occupation: 51

**Focus Occupation:** Airline Pilots, Copilots, and Flight Engineers (53-2011)

**Associated Occupation:** Air Traffic Controllers (53-2021)

Associated Occupation's Key Skills Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating		Evaluation of Focus Occupation
Complex Problem Solving	9.1	15.7	13.3	<	A higher skill level may be required
Active Listening	11.0	15.6	13.5	<	A higher skill level may be required
Judgment and Decision Making	9.4	15.6	15.2	0	Current skill level may be sufficient
Monitoring	9.9	15.4	12.8	<	A higher skill level may be required
Critical Thinking	10.8	14.3	15.0	0	Current skill level may be sufficient
Coordination	9.1	12.6	12.3	0	Current skill level may be sufficient
Active Learning	8.7	12.5	12.0	0	Current skill level may be sufficient

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O\*NET (Occupation Information Network) data.

Abilities		Similarity of Focus Occupation to Associated Occupation: 57			
Focus Occupation: Airline Pilots, Copilots, and Flight Engineers (53-2011) Associated Occupation: Air Traffic Controllers (53-2021)					
Associated Occupation's Key Abilities Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating	Evaluation of Focus Occupation	
Time Sharing	6.6	17.8	13.8	<<	Extensive improvement in abilities may be required
Problem Sensitivity	11.1	17.1	18.2	0	Current ability level may be sufficient
Flexibility of Closure	7.8	17.0	14.1	<	Some improvement in abilities may be required
Selective Attention	8.7	16.2	15.0	0	Current ability level may be sufficient
Deductive Reasoning	10.6	15.9	14.5	0	Current ability level may be sufficient
Speed of Closure	5.9	15.6	11.0	<<	Extensive improvement in abilities may be required
Speech Recognition	9.9	15.4	12.2	<<	Extensive improvement in abilities may be required
Far Vision	7.8	14.5	18.3	>>	Current ability level is likely more than sufficient
Perceptual Speed	7.4	14.2	13.6	0	Current ability level may be sufficient
Auditory Attention	5.9	12.3	11.2	0	Current ability level may be sufficient

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O\*NET (Occupation Information Network) data.

Activities that Both Occupations Have in Common		Similarity of Focus Occupation to Associated Occupation: 85
Focus Occupation: Airline Pilots, Copilots, and Flight Engineers (53-2011) Associated Occupation: Air Traffic Controllers (53-2021)		
Work Activities	Exclusivity of Activity	
Make decisions	24	
Perform safety inspections in transportation setting	62	
Read maps	42	
Read navigation charts	85	
Sustain attention in air traffic emergencies	92	
Understand English for aviation communications	89	
Understand technical operating, service or repair manuals	6	
Use aircraft safety regulations	85	
Use local or regional geographical knowledge to transportation	70	
Use two-way radio or mobile phone	42	

Not all positions in these occupations will necessarily perform all of the listed activities. The exclusivity rating is an indication of how unique the activity is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations engage in that activity.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O\*NET (Occupation Information Network) data.

## Tools and Technologies that Both Occupations Have in Common

Similarity of Focus  
Occupation to Associated  
Occupation: 88

**Focus Occupation: Airline Pilots, Copilots, and Flight Engineers (53-2011)**  
**Associated Occupation: Air Traffic Controllers (53-2021)**

Tools and Technologies	Exclusivity
Aerospace location and navigation systems and components	70
Computers	1
Flight communications related systems	70
Industry specific software	1

Not all positions in these occupations will necessarily use all of the listed tools and technologies. The exclusivity rating is an indication of how unique the tool or technology is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations use that tool or technology.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O\*NET (Occupation Information Network) data.